

**Master Environmental Library
(MEL)**

**Software Version Description
(MEL Regional Site Software 1.1)**



15 May 1997

**Defense Modeling and Simulation Office
Alexandria, VA**

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(MEL)

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(MEL Regional Site Software 1.1)**

Version 1.0

15 May 1997

Prepared By:
MAR, Inc.
99 Pacific St., Suite 200E
Monterey, CA 93940

SOFTWARE VERSION DESCRIPTION - MRSS 1.1

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Approval:

Director,
Defense Modeling and Simulation Office

FOREWORD

The Defense Modeling and Simulation Office (DMSO) was established to serve as the executive secretariat for the Executive Council on Modeling and Simulation (EXCIMS) and to provide a full-time focal point for information concerning Department of Defense (DoD) Modeling and Simulation (M&S) activities. Currently the DMSO promulgates M&S policy, initiatives, and guidance to promote cooperation among DoD components to maximize efficiency and effectiveness. DMSO is a staff activity reporting to the Director, Defense Research and Engineering (DDR&E), office of the Under secretary of Defense for Acquisition and Technology (USD(A&T)).

This document will be reviewed and updated by the DMSO as required to maintain currency. Comments and recommendations should be forwarded for review and consideration for inclusion to:

Director,
Defense Modeling and Simulation Office
1901 N. Beauregard St., Suite 504
Alexandria, VA 22311
(703) 998-0660

LIST OF EFFECTIVE PAGES

Page Number	Change Number
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SOFTWARE VERSION DESCRIPTION - MRSS 1.1

RECORD OF CHANGES

Change Number	Date of Change	Change Description	Date Entered	Entered by

TABLE OF CONTENTS

FOREWORD	iv
LIST OF EFFECTIVE PAGES.....	v
RECORD OF CHANGES.....	vi
TABLE OF CONTENTS	vii
SECTION 1. SCOPE	1
1.1 IDENTIFICATION	1
1.2 SYSTEM OVERVIEW	1
1.3 DOCUMENT OVERVIEW	2
SECTION 2. REFERENCED DOCUMENTS	3
2.1 GOVERNMENT DOCUMENTS.....	3
2.1.1 STANDARDS	3
2.1.2 OTHER PUBLICATIONS.....	3
2.2 NON-GOVERNMENT DOCUMENTS.....	3
SECTION 3. VERSION DESCRIPTION.....	4
3.1 INVENTORY OF MATERIALS RELEASED	4
3.2 INVENTORY OF SOFTWARE CONTENTS.....	4
3.3 CHANGES INSTALLED.....	13
3.4 ADAPTATION DATA.....	13
3.5 RELATED DOCUMENTS	13
3.6 INSTALLATION INSTRUCTIONS.....	13
3.7 POSSIBLE PROBLEMS OR KNOWN ERRORS	13
SECTION 4. NOTES.....	15

NOTE: Conventions

This manual uses the following typographical conventions:

CAPITAL LETTERS for the names of Internet protocols, acronyms, and abbreviations.

Boldface type for emphasis and references to other sections in this manual.

Italic font for words which have special meaning in reference to the MEL Regional Site Software.

Monospaced font for keywords in computer system commands, directory path names, and file names.

In proper context, the text in [square brackets] represents command options and text in <angle brackets> represents items the user should replace with applicable text.

Monospaced italic font for Internet addresses.

SOFTWARE VERSION DESCRIPTION - MRSS 1.1

SECTION 1. SCOPE

1.1 IDENTIFICATION

This Software Version Description (SVD) pertains to Version 1.1 of the MEL Regional Site Software (MRSS). This document is intended for distribution to organizations associated with installation, operation and maintenance of that software.

1.2 SYSTEM OVERVIEW

The Master Environmental Library (MEL) is an Internet-based data discovery and retrieval system that provides access to geographically distributed oceanographic, meteorological, terrain, and near-space databases. The MEL is based on a library paradigm in which users, through the MEL Access Site, query a distributed card catalog. The “cards” in the card catalog serve as the common denominator among different types of data in the library. These consist of metadata records that comply with the United States Federal Geographic Data Committee (FGDC) content standards for digital geo-spatial metadata. The MEL Access Site consists of an Internet HTTP Server (also referred to as the web server) that provides access to Hypertext Markup Language (HTML) and JAVA™ interfaces, and other supporting Common Gateway Interface (CGI) programs.

MEL users search for and order available data through a World Wide Web (WWW) browser client application on their computer. They may choose either the HTML or Java interface to interactively create a Query and then a Request for data. Such Queries and Requests can include a region of interest, time range, category keywords, and data center elements. The Query is run against metadata records for all the Regional Sites specified in the Query. Query results are presented to the user who can then examine the full text of the metadata record, view browse graphics associated with the metadata record, and link directly to the data or data center or generate an order form customized for the chosen dataset. The Java Query provides an interactive interface that allows information to be visually compared, thus guiding users through a potentially large set of resulting data that meet the user's query criteria to the specific datasets of interest. Users can order existing datasets, or where applicable, subscribe to receive datasets as they are produced.

Orders for data are sent to the respective MEL Regional Site by electronic mail and processed by the MRSS. This customizable software parses the e-mail orders, provides access control, handles scheduling of requests, extracts data from the local databases, formats, compresses, encrypts (if necessary) and delivers the data files, and finally notifies the user by e-mail of the order delivery.

SOFTWARE VERSION DESCRIPTION - MRSS 1.1

The MEL project is sponsored by the Defense Modeling and Simulation Office (DMSO), under the direction and funding of DMSO Executive Agents (EA) for air and space, oceans, and terrain. The MEL Project Manager is Dr. Richard Siquig.

1.3 DOCUMENT OVERVIEW

This document identifies and describes Version 1.1 of the MRSS, and is designed to be used to release, track and control this software.

SOFTWARE VERSION DESCRIPTION - MRSS 1.1

SECTION 2. REFERENCED DOCUMENTS

2.1 GOVERNMENT DOCUMENTS

2.1.1 STANDARDS

- a. MIL-STD-498, Software Development and Documentation, 5 Dec 94.

2.1.2 OTHER PUBLICATIONS

- a. DI-IPSC-81442, Data Item Description for Software Version Description, 5 Dec 94.
- b. Software Center Operator Manual - MRSS, DMSO, May 97.

2.2 NON-GOVERNMENT DOCUMENTS

None

SOFTWARE VERSION DESCRIPTION - MRSS 1.1

SECTION 3. VERSION DESCRIPTION

3.1 INVENTORY OF MATERIALS RELEASED

The MRSS is distributed as a single file in UNIX Tape Archive ("tar") format, compressed with the standard UNIX "compress" program. Distribution is by way of the Internet using the HTTP protocol, and the distribution address is:

http://www-mel.nrlmry.navy.mil/users-bin/order_rss

The filename is `rss1.1.tar.Z`

Access to the MRSS distribution file is restricted by Internet Protocol (IP) address. Requests for access authorization may be sent to the MEL Access Site Administrator at the following e-mail address:

mel_access_admin@nrlmry.navy.mil

3.2 INVENTORY OF SOFTWARE CONTENTS

In the listings that follow, filenames are shown first, followed by their size (in bytes), and their date and time of creation. Listings in the File Name column that end in "/" are subdirectories.

Some subdirectories are intentionally empty. The following directories are for MRSS runtime files.

In the MRSS top-level directory (\$RSS_DIR):

<u>File Name</u>	<u>Size</u>	<u>Date</u>	<u>Time</u>
CHANGES	1345	4/21	15:49
README	307	4/21	15:49
VERSION_1.1.00	75	4/21	15:49
bin/	512	4/22	13:27
cgi-bin/	512	4/21	15:49
contrib/	512	4/21	15:49

SOFTWARE VERSION DESCRIPTION - MRSS 1.1

data/	512	4/21	15:49
doc/	512	4/21	15:49
inspath	738	4/21	15:49
install_rss	2760	4/21	15:49
lib/	512	4/21	15:49
log/	512	4/21	15:49
runtime/	512	4/21	15:49
src/	512	4/21	15:49
subscriptions/	512	4/21	15:49
tmpl/	512	4/21	15:49

In Subdirectory ./bin:

<u>File Name</u>	<u>Size</u>	<u>Date</u>	<u>Time</u>
mail/	512	4/21	15:49
mel_access	3491	4/21	15:49
mel_cleanup	3984	4/21	15:49
mel_deliver	9490	4/21	15:49
mel_extract	4694	4/21	15:49
mel_postproc	4963	4/21	15:49
mel_rrh	14347	4/21	15:49
mel_scheduler	15284	4/21	15:49
rss_patch	1785	4/21	15:49
showjcb	2182	4/21	15:49
subread	1335	4/21	15:49

SOFTWARE VERSION DESCRIPTION - MRSS 1.1

In Subdirectory ./bin/mail

<u>File Name</u>	<u>Size</u>	<u>Date</u>	<u>Time</u>
test.mail	3103	4/21	15:49

In Subdirectory ./cgi-bin:

<u>File Name</u>	<u>Size</u>	<u>Date</u>	<u>Time</u>
AdminTool	423	4/21	15:49
DAM_main.cgi	4467	4/21	15:49
access.cgi	3611	4/21	15:49
adduser.cgi	1109	4/21	15:49
default.cgi	548	4/21	15:49
delete.cgi	1743	4/21	15:49
delete_ver.cgi	3149	4/21	15:49
index.cgi	3542	4/21	15:49
jcb_1a.cgi	5252	4/21	15:49
jcb_2.cgi	4065	4/21	15:49
meljobs.cgi	1115	4/21	15:49
pgpmgr	40087	4/21	15:49
readnew	7215	4/21	15:49
reconfigure2.cgi	5132	4/21	15:49
reconfigure2_update.cgi	763	4/21	15:49
savuser.cgi	1259	4/21	15:49
screens	2750	4/21	15:49
stats.cgi	469	4/21	15:49

SOFTWARE VERSION DESCRIPTION - MRSS 1.1

translog.cgi	2054	4/21	15:49
update.cgi	389	4/21	15:49
update2.cgi	2078	4/21	15:49

In Subdirectory ./contrib:

<u>File Name</u>	<u>Size</u>	<u>Date</u>	<u>Time</u>
EXAMPLES	415	4/21	15:49
README	362	4/21	15:49
check_status	4479	4/21	15:49
check_status.eg	719	4/21	15:49
inc.pl	80	4/21	15:49
move_logs	549	4/21	15:49

In Subdirectory ./data:

<u>File Name</u>	<u>Size</u>	<u>Date</u>	<u>Time</u>
usmail/	512	4/21	15:49

In Subdirectory ./data/usmail:

In Subdirectory ./doc:

<u>File Name</u>	<u>Size</u>	<u>Date</u>	<u>Time</u>
html	512	4/22	13:26

SOFTWARE VERSION DESCRIPTION - MRSS 1.1

In Subdirectory ./doc/html:

<u>File Name</u>	<u>Size</u>	<u>Date</u>	<u>Time</u>
graphics/	512	4/21	15:49
meldocs.html	7747	4/21	15:49

In Subdirectory ./doc/html/graphics:

<u>File Name</u>	<u>Size</u>	<u>Date</u>	<u>Time</u>
A097.jpg	2934	4/21	15:49
AT_WORK_.GIF	271	4/21	15:49
BUTTON1-TRANS.GIF	2300	4/21	15:49
CRYSTAL_B.GIF	599	4/21	15:49
GLOBE.GIF	6471	4/21	15:49
LTBKGRND.GIF	4244	4/21	15:49
binoc_bt.gif	2206	4/21	15:49
codebtn.gif	260	4/21	15:49
greybox.gif	1927	4/21	15:49
key.gif	268	4/21	15:49
large_mel_logo.gif	23557	4/21	15:49
log.gif	1187	4/21	15:49
magnifying_g.gif	343	4/21	15:49
manual.gif	437	4/21	15:49
reconfigure.gif	260	4/21	15:49
restart.gif	305	4/21	15:49
stats.gif	538	4/21	15:49

SOFTWARE VERSION DESCRIPTION - MRSS 1.1

stats_gr.gif	299	4/21	15:49
tool.gif	217	4/21	15:49

In Subdirectory ./lib:

<u>File Name</u>	<u>Size</u>	<u>Date</u>	<u>Time</u>
Asso.pm	701	4/21	15:49
DAM.pm	14367	4/21	15:49
Data_resolution.pl	1723	4/21	15:49
Logger.pm	6054	4/21	15:49
acl.pl	3633	4/21	15:49
array_DAM.pm	56486	4/21	15:49
err_mail.pl	1685	4/21	15:49
extract_grid.pl	3185	4/21	15:49
ftp.pl	25942	4/21	15:49
ftp_util.pl	4046	4/21	15:49
gpe.pl	6725	4/21	15:49
header.old	973	4/21	15:49
header.pl	1299	4/21	15:49
help.pl	3027	4/21	15:49
jcb.pl	7567	4/21	15:49
lchat.pl	6199	4/21	15:49
logging.pl	617	4/21	15:49
mel_admin_users.list	437	4/21	15:49
mel_util.pl	3673	4/21	15:49

SOFTWARE VERSION DESCRIPTION - MRSS 1.1

parser.pl	1003	4/21	15:49
parsing.pl	8145	4/21	15:49
pgp.pl	9653	4/21	15:49
pgp2.pl	22645	4/21	15:49
pgppass.pl	252	4/21	15:49
redirect.pl	140	4/21	15:49
rss_example.pl	1304	4/21	15:49
signal_handler.pl	439	4/21	15:49
subscribe.pl	3303	4/21	15:49
templates.pl	5319	4/21	15:49

In Subdirectory ./log:

<u>File Name</u>	<u>Size</u>	<u>Date</u>	<u>Time</u>
history/	512	4/21	15:49
msg/	512	4/21	15:49
trans/	512	4/21	15:49

In Subdirectory ./log/history: Empty

In Subdirectory ./log/msg: Empty

In Subdirectory ./log/trans: Empty

In Subdirectory ./runtime:

SOFTWARE VERSION DESCRIPTION - MRSS 1.1

<u>File Name</u>	<u>Size</u>	<u>Date</u>	<u>Time</u>
DAM.list	503	4/21	15:49
JCB	0	4/21	15:49
jobnumber	0	4/21	15:49
schedule.dat	1529	4/21	15:49

In Subdirectory ./src:

<u>File Name</u>	<u>Size</u>	<u>Date</u>	<u>Time</u>
README	884	4/21	15:49
schedule.dat	1450	4/21	15:49
subtime.ansi	6670	4/21	15:49
subtime.c	7074	4/21	15:49
subtime.c.bak	7074	4/21	15:49
subtime.kr	6670	4/21	15:49

In Subdirectory ./subscriptions:

<u>File Name</u>	<u>Size</u>	<u>Date</u>	<u>Time</u>
RSS_EXAMPLE_DSET/	512	4/21	15:49

In Subdirectory ./subscriptions/RSS_EXAMPLE_DSET: Empty

In Subdirectory ./tpl: Empty

SOFTWARE VERSION DESCRIPTION - MRSS 1.1

3.3 CHANGES INSTALLED

Version 1.1 is the initial controlled release of the MRSS.

3.4 ADAPTATION DATA

None required.

3.5 RELATED DOCUMENTS

- a. **Software Center Operator Manual - MEL Regional Site Software (SCOM-MRSS)**, DMSO, May 97.

3.6 INSTALLATION INSTRUCTIONS

Detailed instructions for the installation and setup of the MRSS may be found in the SCOM-MRSS document.

3.7 POSSIBLE PROBLEMS OR KNOWN ERRORS

- a. The Admin Tool does not check passwords/IP addresses as stated, however, a patch is planned for this.
- b. Passwords for the Data Access Mechanism have not been implemented, and the PasswordRequired option should not be used at this time. This problem will be addressed in the next release of the MRSS.
- c. On page 16 of the installation instructions that were provided with the Version 1.1 software release, make the following corrections:

“Change \$CGI_URL to \$RSS_DIR/cgi-bin”

should read

“Change \$CGI_URL to an http server alias for \$RSS_DIR/cgi-bin”.

“Change \$DOC_URL to \$RSS_DIR/doc/html”

should read

“Change \$DOC_URL to an http server alias for \$RSS_DIR/doc/html”.

SOFTWARE VERSION DESCRIPTION - MRSS 1.1

- d. On page 20 of the installation instructions that were provided with the Version 1.1 software release, change all instances of `melrequests.cgi` to `meljobs.cgi`.

SECTION 4. NOTES